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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/057,199	01/25/2002	Jeff Powell	60426-405/2002P01070US	3319

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SIEMENS CORPORATION
INTELLECTUAL PROPERTY LAW DEPARTMENT
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EXAMINER	
COMPTON, ERIC B	

ART UNIT	PAPER NUMBER
3726	

DATE MAILED: 03/19/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/057,199	POWELL, JEFF	
	Examiner	Art Unit	
	Eric B. Compton	3726	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *19 February 0204*.

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *14-24* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *14-24* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date _____.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

Claim Rejections - 35 USC § 103

1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

2. Claims 14-24 are rejected under 35 U.S.C. 103(a) as being unpatentable over Applicant's admitted Prior Art (AAPA), in light of U.S. Pat. 5,807,052 to Van Boven et al. ("Van Boven"), and in further view of U.S. Pat. 2,761,202 to Beare.

AAPA, as found in Sections [0003 – 0004] of the Specification, discloses

> In an intake manifold assembly, fasteners are utilized to secure a plastic intake manifold to a component. The bolt load applied to the plastic intake manifold is reduced over time due to a condition known as material creep. Compression limiters are commonly employed to transmit the bolt load to the component and minimize plastic material creep.
>
> In the prior art, metal compression limiters are inserted into a bore in the plastic intake manifold which receives the fastener, transmitting the bolt load to the component. However, the contact surface area of the compression limiter and the component is relatively small. Therefore, the compression limiters can press into and deform the material of the component over time, reducing the applied bolt load at the location of contact.

The teachings of Van Boven are consistent with the teachings of AAPA. In addition, this reference discloses providing flange portions (124, 126). The flange member "compensates for the susceptibility of the pre-assembled workpieces, especially pre-assembled plastic workpieces, to concentrations of stress and strain caused [by] fastening members ..." Col. 2, lines 8-11.

It would have been obvious to one having ordinary skill in the art at the time the invention was made to have provided the compression limiter of AAPA with a flange (i.e., a protrusion), in light of the teachings of Van Boven, in order to compensate for stress and strain caused by the fastening members. *Id.*

However, AAPA/Van Boven do not disclose forming a compression limiter by forming a plurality of protrusion along a lower edge of a sheet of stock, and roll forming the sheet of stock to form the compression limiter.

Beare discloses a method of forming a "split annular reinforced" bushing. Col. 1, lines 54-55. Beare disclose that the bushing "is adapted for use in a wide variety of installations and may be formed in accordance with the intended use, i.e., the metallic member may be on the inside or outside of the completed bushing, the ***flange portion may be included***, omitted, continuous, or serrated or have castellated portions formed therein ***so as to provide a bearing surface*** and locking means if desired, and the elastomeric portion may have any desired shape." Col. 4, lines 1-8 (emphasis added). Although the intended use is not specified by Beare a bushing is "a usu. removable cylindrical lining for an opening (as of a mechanical part) used to limit the size of the opening, resist abrasion, or serve as a guide." Merriam-Webster's Collegiate Dictionary (10^{th} Ed, 1999). The method includes the steps of: forming a plurality of protrusion (29) along an edge of a sheet of stock (26); and roll forming the sheet of stock to form the bushing (20).

Regarding claim 14, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have formed a compression limiter for the

manifold of AAPA/Van Boven by forming a compression limiter by forming a plurality of protrusion along a lower edge of a sheet of stock, and roll forming the sheet of stock to form the compression limiter, in light of the teachings of Beare, in order to form a compression limiter of any desired size. *See* Co. 1, lines 47-53 (disclosing forming sections of predetermined length from strip material to be formed into the bushing).

Regarding claim 15, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have formed the compression limiter from high carbon steel, since it has been held to be within the general skill of a worker in the art to select a known material on the basis of its suitability for the intended use as a matter of obvious design choice. *In re Leshin*, 125 USPQ 416.

Regarding claim 16, in Beare the protrusions (29) are formed as notches in along an edge of a sheet of stock and bending the protrusions (*see* Col. 3, line 5-14). Furthermore, the protrusions are at 90 degrees (e.g., right angles) from the sheet of stock. *Id.*

Regarding claim 17, in Beare after the edges of the sheet (26, 27) have been rolled a slight gap (44) is formed to define a bore. *Id.*

Regarding claim 18, in Van Boven an angled portion (no ref.) is provided between the flange (protrusion) portion (124) contacting the member (101) and the body member (120) as shown in the Figure 1. This feature allows the protrusion to flex as a compensation means. Col. 6, lines 10-16. Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have formed an angled portion between the flange and body member of the compression limiter, in light

of the teachings of Beare, in order to allow for the protrusions to flex as a compensation means.

Regarding claim 19, in Beare the protrusions (29) are formed as notches in along an edge of a sheet of stock and bending the protrusions (*see* Col. 3, line 5-14). Furthermore, the protrusions are at 90 degrees (e.g., right angles) from the sheet of stock. *Id.*

Regarding claims 20-24, AAPA clearly suggests these limitations, since they are inherently required for the conventional compression limiter.

Response to Arguments

Applicant's arguments with respect to claims 14-24 have been considered but are moot in view of the new ground(s) of rejection.

With regards to claim 15 and material selection, The selection of a known material based on its suitability for its intended use supported a prima facie obviousness determination in *Sinclair & Carroll Co. v. Interchemical Corp.*, 325 U.S. 327, 65 USPQ 297 (1945); *See also* In re Leshin, 227 F.2d 197, 125 USPQ 416 (CCPA 1960). Applicant now has the burden to overcome the prima facie obviousness determination.

Contact Information

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eric B. Compton whose telephone number is (703) 305-0240. The examiner can normally be reached on M-F, 9-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Peter B. Vo can be reached on (703) 308-1789. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Eric Compton
Patent Examiner
A/U 3726

DAVID P. BRYANT
PRIMARY EXAMINER